

SAFETY AND BUILDINGS DIVISION
Plumbing Product Review
P.O. Box 2658
Madison, Wisconsin 53701-2658
TTY: Contact Through Relay

Jim Doyle, Governor Richard J. Leinenkugel, Secretary

October 21, 2008

REVISED COPY

CLOROX SERVICES COMPANY BRITA L.P. JIM WIERSIG PO BOX 493 PLEASANTON CA 94566

Re: Description: WATER TREATMENT DEVICE-ACTIVATED CARBON

Manufacturer: CLOROX SERVICES COMPANY

Product Name: BRITA FAUCET FILTRATION SYSTEM (POU) Model Number(s): FF-100 USING THE FR-200 CARTRIDGE

Product File No: 20080476

The specifications and/or plans for this plumbing product have been reviewed and determined to be in compliance with chapters Comm 82 through 84, Wisconsin Administrative Code, and Chapters 145 and 160, Wisconsin Statutes.

The Department hereby issues an approval based on the Wisconsin Statutes and the Wisconsin Administrative Code. This approval is valid until the end of October 2013.

This approval supersedes the approval issued on September 25, 2003 under product file number 20030351.

This approval is contingent upon compliance with the following stipulation(s):

- ➤ This product has undergone sufficient testing to document the product's ability to reduce only those contaminants and/or substances as specified in this approval letter when the product is installed and maintained in strict accordance with the manufacturers published instructions.
- ➤ Where the Department of Natural Resources (DNR) has jurisdiction, a written approval may be required prior to installation of this product in a water supply system to reduce the concentration of a contaminant that exceeds the primary drinking water standards contained in ch. NR 809, Wis. Admin. Code, the enforcement standards contained in ch. NR 140, Wis. Admin. Code, or for a water supply system that is subject to a written advisory opinion by the DNR. For more information contact the DNR Section of Private Water Systems, P.O. Box 7921, Madison, WI 53707, telephone (608) 266-3415.
- ➤ If this approved device is modified or additional assertions of function or performance are made, then this approval shall be considered null and void, unless the change is submitted to the department for review and the approval is reaffirmed.
- If the treatment components of this device (e.g., replacement cartridge) are replaced with anything other than those originally approved for use with this device, then this approval shall immediately be considered null and void.
- > These devices will only reduce the concentration of volatile organic chemicals at water outlets that are served by the devices. There are dermal (skin) absorption and inhalation exposure risks associated with volatile organic chemicals. Therefore, using point-of-use devices such as these will not protect all routes of potential exposure. Potentially hazardous exposures to volatile organic chemicals will remain possible at unprotected outlets, particularly hot water outlets (e.g. bathing, showering, clothes washing or dish washing).

If, by way of reputable water analyses, a water supply is known to contain unsafe levels of volatile organic chemicals, then all the water entering the residence must be treated at the point-of-entry using an approved water treatment device to address all potential routes of exposure.

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These devices will only reduce the concentration of cysts/oocysts at water outlets that are served by the devices. Therefore, using point-of-use devices such as these will not protect all routes of potential exposure. Potentially hazardous exposures to cysts/oocysts will remain possible at unprotected outlets.

The presence of cysts/oocysts strongly suggests that other pathogens (e.g. bacteria, virus) may also be present.

If, by way of reputable water analyses, a water supply is known to contain cysts/oocysts, then all the water entering the residence must be treated at the point-of-entry, using an approved water treatment device, to address all potential routes of exposure thereby providing a biologically safe water supply.

Based on testing data submitted to and reviewed by the department, this approval recognizes that these plumbing products will reduce the concentration of contaminants as specified on pages 1 through 6 of this letter.

AESTHETIC CONTAMINANT REDUCTION CAPABILITIES PRODUCT FILE NUMBER 20080476 TABLE 1 OF 5

Flow Rate: 2.3 liters per minute (lpm) [0.6 gallon per minute (gpm)]

Capacity: 379 liters (I) [100 gallons (gals.)], for particulate reduction the capacity is dependent on

the type and quantity of particulate matter present in the untreated water.

Tested Contaminant	Influent Challenge (mg/l) ^{1,1}
Chlorine (free)	2.0 ± 10%
Particulates (0.5 to < 1.0 μm)	≥ 1.0 x 10 ⁴ #/ml

Other Conditions: the contaminant reduction performance capabilities displayed for Table 1 of 5 were verified by testing conducted in accordance with NSF *International* Standard 42. To qualify for free chlorine reduction, the device must reduce the influent challenge concentrations by \geq 50%; meeting the free chlorine reduction requirements also qualifies the device for the reduction of aesthetic, organic, taste and odor reduction (e.g. geosmin, methylisoborneol); this does not include hydrogen sulfide. To qualify for particulate reduction (Class I) the device must reduce the influent challenge concentrations by \geq 85%.

1 = milligrams per liter (mg/l) are equivalent to parts per million (ppm)

≥ = greater than or equal to

± = plus or minus

#/ml = particles per milliliter

< = less than

 μm = micrometers

* = unless otherwise specified

≤ = less than or equal to

HEALTH EFFECTING INORGANIC CONTAMINANT REDUCTION CAPABILITIES PRODUCT FILE NUMBER 20080476 TABLE 2 OF 5

Flow Rate: 2.3 liters per minute (lpm) [0.6 gallon per minute (gpm)]

Capacity: 379 liters (I) [100 gallons (gals.)], for asbestos reduction the capacity is dependent on the

type and quantity of particulate matter present in the untreated water; the need for

maintenance may be indicated by a significant decrease in flow rate.

Tested Contaminant	Influent Challenge (mg/l) ^{^,1}
Asbestos fibers (> 10μm in length)	1.0 x 10 ⁷ to 1.0 x 10 ⁸ F/I
Lead (Pb ⁺²) 2	0.15 ± 10%

Other Conditions: the contaminant reduction performance capabilities displayed for Table 2 of 5 were verified by testing conducted in accordance with NSF *International* Standard 53. To qualify for Asbestos reduction, the device must reduce the influent challenge concentrations by \geq 99%. To qualify for Lead reduction, the device must reduce the influent challenge concentrations so that all effluent concentrations are \leq 0.010 mg/l.

1 = milligrams per liter (mg/l) are equivalent to parts per million (ppm)

2 = metals are tested at pH 6.5 and pH 8.5

 \pm = plus or minus

μm = micrometers ≤ = less than or equal to

F/I = fibers per liter

> = greater than

≥ = greater than or equal to

* = unless otherwise specified

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HEALTH EFFECTING BIOLOGICAL CONTAMINANT REDUCTION CAPABILITIES PRODUCT FILE NUMBER 20080476 TABLE 3 OF 5

Flow Rate: 2.3 liters per minute (lpm) [0.6 gallon per minute (gpm)]

Capacity: dependent on the type and quantity of particulate matter present in the untreated water; the

need for maintenance may be indicated by a significant decrease in flow rate.

Tested Contaminant	Influent Challenge (#/ml)
Cysts/Oocysts ¹	≥ 5.0 x 10 ⁴

Other Conditions: the contaminant reduction performance capabilities displayed for Table 3 of 5 were verified by testing conducted in accordance with NSF *International* Standard 53. To qualify for cyst/oocyst reduction, the device must reduce the influent challenge concentrations by ≥ 99.95% at each sample point.

1 = the specific organisms covered under this testing protocol include cryptosporidium parvum, entamoeba histolytica, giardia lamblia and toxoplasma gondii

≥ = greater than or equal to #/ml = particles per milliliter

HEALTH EFFECTING ORGANIC CONTAMINANT REDUCTION CAPABILITIES PRODUCT FILE NUMBER 20080476 TABLE 4 OF 5

Flow Rate: 2.3 liters per minute (lpm) [0.6 gallon per minute (gpm)]

Capacity: 379 liters (I) [100 gallons (gals.)]

Tested Contaminant	Influent Challenge (μg/l) ¹
Alachlor	40 ± 10%
Atrazine	9 ± 10%
Benzene	15 ± 10%
Carbofuran	80 ± 10%
Carbon tetrachloride	15 ± 10%
Chlordane	40 ± 10%
Chlorobenzene	2,000 ± 10%
2,4-D	210 ± 10%
o-Dichlorobenzene	1,800 ± 10%
Endrin	6 ± 10%
Ethylbenzene	2,100 ± 10%
Heptachlor epoxide	4 ± 10%
Lindane	2 ± 10%
Methoxychlor	120 ± 10%
Simazine	12 ± 10%
Styrene	2,000 ± 10%
Tetrachloroethylene	15 ± 10%
Toluene	3,000 ± 10%
Toxaphene	15 ± 10%
Trichloroethylene	300 ± 10%

Other Conditions: the contaminant reduction performance capabilities displayed for Table 4 of 5 were verified by testing conducted in accordance with NSF *International* Standard 53. To qualify for alachlor reduction, the device must reduce the influent challenge concentrations such that all effluent concentrations are $\leq 2 \,\mu g/l$. To qualify for atrazine reduction, the device must reduce the influent challenge concentrations such that all effluent concentrations are $\leq 3 \,\mu g/l$. To qualify for benzene reduction, the device must reduce the influent challenge concentrations such that all effluent concentrations are $\leq 5 \,\mu g/l$. To qualify for carbofuran reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are $\leq 40 \,\mu g/l$.

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HEALTH EFFECTING ORGANIC CONTAMINANT REDUCTION CAPABILITIES PRODUCT FILE NUMBER 20080476 TABLE 4 OF 5 (continued)

To qualify for carbon tetrachloride reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 5 µg/l. To qualify for chlordane reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 2 µg/l. To qualify for chlorobenzene reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 100 µg/l. To qualify for 2,4-D reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 70 μg/l. To qualify for o-dichlorobenzene reduction. the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 600 μα/l. To qualify for endrin reduction, the device must reduce the influent challenge concentrations such that all effluent concentrations are ≤ 2 µg/l. To qualify for ethylbenzene reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 700 µg/l. To qualify for heptachlor epoxide reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 0.2 µg/l. To qualify for lindane reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 0.2 µg/l. To qualify for methoxychlor reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 40 µg/l. To qualify for simazine reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 4 µg/l. To qualify for styrene reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 100 µg/l. To qualify for tetrachloroethylene reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 5 µg/l. To qualify for toluene reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 1,000 µg/l. To qualify for toxaphene reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are ≤ 3 µg/l. To qualify for trichloroethylene reduction, the device must reduce all influent challenge concentrations such that all effluent concentrations are $\leq 5 \mu g/l$.

- 1 = micrograms per liter (µg/l) are equivalent to parts per billion (ppb)
- \leq = less than or equal to
- \pm = plus or minus

HEALTH EFFECTING ORGANIC CONTAMINANT REDUCTION CAPABILITIES PRODUCT FILE NUMBER 20080476 TABLE 5 OF 5

Flow Rate: 2.3 liters per minute (lpm) [0.6 gallon per minute (gpm)]

Capacity: 379 liters (I) [100 gallons (gals.)]

Tested Contaminant	Influent Challenge (μg/L) ¹
Alachlor	50
Atrazine	100
Benzene	81
Carbofuran	190
Carbon tetrachloride	78
Chlorobenzene	77
Chloropicrin	15
2,4-D	110
Dibromochloropropane (DBCP)	52
o-Dichlorobenzene	80
p-Dichlorobenzene	40
1,2-Dichloroethane	88
1,1-Dichloroethylene	83
cis-1,2-Dichloroethylene	170
trans-1,2-Dichloroethylene	86

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HEALTH EFFECTING ORGANIC CONTAMINANT REDUCTION CAPABILITIES PRODUCT FILE NUMBER 20080476 TABLE 5 OF 5 (continued)

Flow Rate: 2.3 liters per minute (lpm) [0.6 gallon per minute (gpm)]

Capacity: 379 liters (I) [100 gallons (gals.)]

Tested Contaminant	Influent Challenge (μg/L) ¹
1,2-Dichloropropane	80
cis-1,3-Dichloropropylene	79
Dinoseb	170
Endrin	53
Ethylbenzene	88
Ethylene dibromide (EDB)	44
Haloacetonitriles (HAN):	-
Bromochloroacetonitrile	22
Dibromoacetonitrile	24
Dichloroacetonitrile	9.6
Trichloroacetonitrile	15
Haloketones (HK):	-
1,1-Dichloro-2-propanone	7.2
1,1,1-Trichloro-2-propanone	8.2
Heptachlor (H-34, HEPTOX)	80
Heptachlor epoxide	10.7
Hexachlorobutadiene	44
Hexachlorocyclopentadiene	60
Lindane	55
Methoxychlor	50
Pentachlorophenol	96
Simazine	120
Styrene	150
1,1,2,2-Tetrachloroethane	81
Tetrachloroethylene	81
Toluene	78
2,4,5-TP (silvex)	270
Tribromoacetic acid	42
1,2,4-Trichlorobenzene	160
1,1,1-Trichloroethane	84
1,1,2-Trichloroethane	150
Trichloroethylene	180
Chloroform (surrogate for organic	300 ± 10%
chemicals)	
Total Trihalomethanes (chloroform	450 ± 20%
surrogate for total trihalomethanes) [‡]	
Xylenes (total)	70

Other Conditions: the contaminant reduction performance capabilities displayed for Table 5 of 5 were verified by testing conducted in accordance with NSF *International* Standard 53. To qualify for the reduction of the organic contaminants listed above, the device must reduce the influent challenge concentration of chloroform at 300 μ g/L \pm 10% at each sample point by a minimum of 95%. To qualify for trihalomethanes reduction, the device must reduce the influent challenge concentration of chloroform at 450 μ g/l \pm 20% such that all effluent concentrations are \leq 80 μ g/l.

 $^{1 =} micrograms per liter (\mu g/I)$ are equivalent to parts per billion (ppb)

[‡] = tested independently of the chloroform surrogate for organic chemical reduction

 $[\]pm$ = plus or minus

^{≤ =} less than or equal to

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This device was tested under controlled laboratory, or field, conditions. The actual performance of this device for a specific end use installation will vary from the tested conditions based on local factors such as water pressure, water temperature and water chemistry.

The department is in no way endorsing this product or any advertising, and is not responsible for any situation that may result from its use.

Sincerely,

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